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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/663,775

09/17/2003

Naohide Maeda

Q77539

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09/07/2004

SUGHRUE MION, PLLC
2100 PENNSYLVANIA AVENUE, N.W.
SUITE 800
WASHINGTON, DC 20037

EXAMINER

NGUYEN, TRAN N

ART UNIT

PAPER NUMBER

2834

DATE MAILED: 09/07/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/663,775	MAEDA ET AL.	
	Examiner	Art Unit	
	Tran N. Nguyen	2834	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on 29 July 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☐ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) 2,4,6,8,10 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) 1,3,5,7 and 9 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Election/Restriction

This application contains claims directed to the following patentably distinct species of the claimed invention:

Species	Figures	Claims
1	1-2, 6-10	1, 3, 5, 7, 9
2	1, 3-10	2, 4, 8, 10

Applicants selected claims 1, 3, 5, 7 and 9 which are drawn to species 1 without traverse is hereby acknowledge by the Examiner of record.

Claim Rejections - 35 USC § 112

1. **Claims 1, 3, 5, 7, 9** are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, “*wherein a magnet assembly composed of a magnet for reducing leakage of magnetic flux and a magnet-holding member for supporting said magnet on said claw magnetic poles are arranged on said claw magnetic poles so that center of gravity of said magnet assembly is located on the base part side nearer than the center of said claw magnetic poles*” is indefinite because it is unclear whether:

- (a) the magnet assembly’s center of gravity being located on the base part side nearer than being located on the center of the claw pole; or,
- (b) the magnet assembly’s center of gravity is located on the base part side nearer than the center (of gravity) of the claw pole (with respect to the base part side); or
- (c) the magnet assembly’s center of gravity is located on the base part side nearer than on the axial center of the axial length of the claw pole.

In light of the spec (fig 2), it is understood as

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“the magnet assembly’s center of gravity is located on the base part side nearer than the axial center of the axial length of the claw pole”.

In claim 7, “said magnet holding members” (written in plural form) lacks antecedent basis because the independent claim 1 recite (single form) *a* magnet holding member.

In claim 9, “magnet ... is arranged on the reverse side of said claw magnetic poles” is indefinite because (1) “the reverse side” lacks antecedent basis; (2) “the reverse side” does not have a reference, i.e., the inner radial side (which facing the rotor’s coil) of the claw pole or the outer radial side (which facing the stator) of the claw pole?

In light of the spec, it is understood as ***“magnet ... is arranged on an inner radial side of said claw magnetic poles”***.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. **Claims 1, 3, 5, 7 and 9, as understood,** are rejected under 35 U.S.C. 102(b) as being fully anticipated by **York et al (US 6426581)**.

York discloses a rotor of an electric rotating machine (figs 1-3) comprising:

a rotor coil (28) for generating a magnetic flux by applying a current; and

a pole core comprised of a first pole core body (22) and a second pole core body (24) that are disposed so as to cover the rotor coil, each being provided with claw-shaped claw magnetic poles (32, 34) engaging with each other;

wherein a magnet assembly composed of magnets (38) for reducing leakage of magnetic flux and a magnet-holding member (30) for supporting said magnet on said claw magnetic poles are arranged on said claw magnetic poles;

as shown by York’s figs 2-4, the magnet assembly is configured to be shorter than the axial length of the claw poles and is located the base part of the pole core. Therefore, the

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center of gravity of said magnet assembly would inherently located on the base part side nearer than on the axial center length of said claw magnetic poles and/or nearer than the center of gravity of the claw poles; and,

wherein the magnet assembly extends to the base parts, i.e., the root parts of the claw poles being near the disc-shaped portion of the pole cores; and,

wherein the magnet-holding member extends to backside of the pole and is fitted to said claw magnetic poles, and magnet-holding members (36) are joined together on said backside of the pole by a ring (31), and the magnets (38) is located on the inner radial side of the claw poles.

Double Patenting

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

3. **Claims 1, 3 and 5** rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over **claims 1 and 16 of U.S. Patent No. 6201335** (hereafter USP'335).

Although the conflicting claims are not identical, they are not patentably distinct from each other because both the present application and the USP'335 recited similar subject matter. Particularly, the limitations of the magnet assembly with the center of gravity thereof located close to the root side of the claw-like magnetic pole (as claimed in the USP '335) is read as the center of gravity of said magnet assembly located near (close) on the base part side (i.e., the root) of said claw magnetic poles.

4. **Claims 7 and 9** are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over **claims 1 and 16 of USP'335** and in view of **York et al (US 6426581)**.

Claims 1 and 16 of USP'335 claims similar invention as in the present invention, except for the limitations of the magnet-holding member extends to backside of the pole and is fitted to said claw magnetic poles, and magnet-holding members are joined together on said backside of the pole, and the magnets is located on the inner radial side of the claw poles.

York, however, teaches a claw pole rotor with these features (figs 1-4) for the purpose of enhance the abutment of the magnets thereof and having a simplified magnet retainer ring that is robust and that protects the magnets from becoming damaged or fragmented during operation of the rotor.

Thus, it would have been obvious to one skilled in the art at the time the invention was made to modify the USP'335 rotor by configuring the magnet holder and arrange the magnet so that magnet-holding members are joined together on said backside of the pole, and the magnets is located on the inner radial side of the claw poles, as taught by York. Doing so would enhance the abutment of the magnet assembly in the rotor.

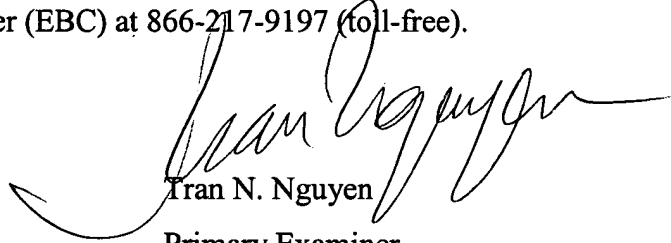
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tran N. Nguyen whose telephone number is (571) 272-2030. The examiner can normally be reached on M-F 7:00AM-4:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Darren Schuberg can be reached on (571)-272-2044. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read "Tran N. Nguyen", is written over the printed name.

Tran N. Nguyen

Primary Examiner

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